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KYOCERA WIRELESS CORP.			KANG, INSUN	
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2193

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Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/916,460

Applicant(s)

RAJARAM ET AL.

Examiner

Insun Kang

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 November 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-58 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-58 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. This action is in response to the amendment filed 11/3/2005.
2. As per applicant's request, Claims 1-58 are pending in the application.

Double Patenting

3. A rejection based on double patenting of the "same invention" type finds its support in the language of 35 U.S.C. 101 which states that "whoever invents or discovers any new and useful process ... may obtain a patent therefor ..." (Emphasis added). Thus, the term "same invention," in this context, means an invention drawn to identical subject matter. See *Miller v. Eagle Mfg. Co.*, 151 U.S. 186 (1894); *In re Ockert*, 245 F.2d 467, 114 USPQ 330 (CCPA 1957); and *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970).

A statutory type (35 U.S.C. 101) double patenting rejection can be overcome by canceling or amending the conflicting claims so they are no longer coextensive in scope. The filing of a terminal disclaimer cannot overcome a double patenting rejection based upon 35 U.S.C. 101.

4. Claims 1-58 are provisionally rejected under 35 U.S.C. 101 as claiming the same invention as that of claim 4-30, 32, and 34-57 of copending Application No. 09/916900.

The following example is given:

Per claim 3:

Copending claim 1 recites --**In a wireless communications device, a method for reorganizing software instructions stored in a memory, the method comprising:** ("In a wireless communications device, a method for updating system software stored in memory, the method comprising") **storing wireless device system software in a plurality of current code sections** ("storing system software for the wireless device in a plurality of current code sections;"); **receiving a new code**

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section("receiving a new code section;"); **resizing current code sections** ("arranging the first plurality of symbol libraries into a second plurality of code sections"); **arranging the new code section with the current code sections to form updated system software for the wireless device** ("arranging the new code section with current code sections to form updated system software for the wireless device"); **and, executing the updated system software** ("executing the updated system software"); **forming the system software into a first plurality of symbol libraries, each symbol library comprising at least one symbol; and, arranging the first plurality of symbol libraries into a second plurality of code sections** ("forming the system software into a first plurality of symbol libraries, each symbol library comprising at least one symbol; and, arranging the first plurality of symbol libraries into a second plurality of code sections") as recited in instant claim 3.

This is a provisional double patenting rejection since the conflicting claims have not in fact been patented.

5. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

6. Claims 1-58 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 39-52 of copending Application No. 09/917,026.

Although the conflicting claims are not identical, they are not patentably distinct from each other because they are directed to substantially the same invention and recites only obvious differences which would have been obvious to one of ordinary skill in the art of program development at the time of invention such as simply (i) omitting/adding steps or elements along with their functions, and/or (ii) implementing the method steps with means for performing the steps, and/or (iii) computer program implementation of the method, and/or (iv) implementing a system performing the method steps, as explained below.

The following example is given:

Per claim 1:

'026 recites **In a wireless communications device, a system for reorganizing software instructions stored in a memory, the system comprising** ("A method for updating system software in a wireless communications device"): **a code storage section memory including executable wireless device system software differentiated into a plurality of current code sections a file system section memory for receiving new code sections** ("storing said system software update ...a file system section, ...code storage section, and patch manager code section"); **a compactor to resize current code sections** ("arranging said first symbol library, said

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second symbol library"); **and wherein the arrangement of new code sections with the current code sections in the code storage section forms updated system software** ("said second symbol library and the third symbol library are arranged contiguously within a single code section") as recited in the instant claim 29.

This is a provisional double patenting rejection since the conflicting claims have not in fact been patented.

Claim Rejections - 35 USC § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

8. Claims 1-58 are rejected under 35 U.S.C. 102(e) as being anticipated by

Hutchison et al. (US patent 6,449,476) hereafter Hutchison.

Per claim 29:

Hutchison discloses:

- In a wireless communications device, a system for reorganizing software instructions stored in a memory, the system comprising: a code storage section memory including executable wireless device system software differentiated into a plurality of current code

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sections (i.e. col. 1 lines 8-11; col. 4 lines 66-67; col. 5 lines 2-10); a file system section memory for receiving new code sections; a compactor to resize current code sections; and wherein the arrangement of new code sections with the current code sections in the code storage section forms updated system software (i.e. col. 5, lines 62-65; 2-10).

Per claim 30:

The rejection of claim 29 is incorporated, and further, Hutchison teaches:

- the file system section receives a compaction instruction set with instructions for identifying a current code section for updating; and, wherein the compactor replaces the identified current code section in the code storage section with the new code section (i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 31:

The rejection of claim 30 is incorporated, and further, Hutchison teaches:

the code storage section comprises a first plurality of symbol libraries, each symbol library comprising at least one symbol, with the first plurality of symbol libraries being arranged into a second plurality of code sections (i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 32:

The rejection of claim 31 is incorporated, and further, Hutchison teaches:

an airlink interface to receive new code sections; and, wherein the file system section

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receives the new code section via a wireless communications device airlink interface (i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 33:

The rejection of claim 32 is incorporated, and further, Hutchison teaches: the code storage section symbol libraries start at the start of code sections; and, wherein the code storage section includes a first table code section with a code section address table for cross-referencing code section identifiers with corresponding start addresses(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 34:

The rejection of claim 33 is incorporated, and further, Hutchison teaches: the code storage section includes symbols arranged to be offset from their respective code section start addresses; and, wherein the code storage section includes a second table code section with a symbol offset address table for cross-referencing symbol identifiers with corresponding offset addresses, and corresponding code section identifiers(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 35:

The rejection of claim 34 is incorporated, and further, Hutchison teaches: the code storage section includes a second plurality of contiguously addressed memory blocks identified with the corresponding second plurality of code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 36:

The rejection of claim 35 is incorporated, and further, Hutchison teaches:
the code storage section includes code sections sized to accommodate the symbol
libraries arranged within, and memory blocks sized to accommodate the corresponding
code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 37:

The rejection of claim 36 is incorporated, and further, Hutchison teaches:
the code storage section includes code sections sized to accommodate sizes larger
than the symbol libraries arranged within(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 38:

The rejection of claim 37 is incorporated, and further, Hutchison teaches:
the compactor resizes the memory blocks in which corresponding resized code sections
are stored in the code storage section(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 39:

The rejection of claim 38 is incorporated, and further, Hutchison teaches:
the file system section receives a new code section having a first size; wherein
compaction instruction set identifies a current code section having a second size, less
than the first size; and, wherein the compactor increases the size of a memory block

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associated with the identified current code section to at least the first size, and replaces the identified current code section, stored in the corresponding memory block, with the new code section(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 40:

The rejection of claim 39 is incorporated, and further, Hutchison teaches:
the compactor determines the size of symbol libraries arranged within the corresponding code sections, and resizes code sections to more closely match the symbol library sizes arranged within(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 41:

The rejection of claim 40 is incorporated, and further, Hutchison teaches:
the compactor optimally resizes code sections to further subsequent code section resizing and updating operations.

Per claim 42:

The rejection of claim 40 is incorporated, and further, Hutchison teaches:
the compactor accesses start addresses from code section address table, to measure the code sections sizes; and, wherein the compactor accesses symbol offset addresses from the symbol offset address table, to measure the size of the symbol libraries arranged within corresponding code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 43:

The rejection of claim 42 is incorporated, and further, Hutchison teaches:

the code storage section includes symbol libraries with end symbols to signify the end of symbol libraries; and, wherein the compactor uses the end symbol offset addresses to measure the size of symbol libraries arranged within corresponding code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 44:

The rejection of claim 42 is incorporated, and further, Hutchison teaches:

the code storage section includes symbol libraries with size symbols to signify the size of symbol libraries; and, wherein the compactor accesses the size symbols to measure the size of symbol libraries arranged within corresponding code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61)..

Per claim 45:

The rejection of claim 43 is incorporated, and further, Hutchison teaches:

the compactor changes the start addresses of code sections stored in the code storage section, after resizing the code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 46:

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The rejection of claim 45 is incorporated, and further, Hutchison teaches:

the compactor measures the size of the new code section in the file system section and determines if the new code section can be arranged with the current code sections in the code storage section, in response to measuring the size of symbol libraries arranged within corresponding code sections and measuring the size of the new code section(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 47:

The rejection of claim 45 is incorporated, and further, Hutchison teaches:

the file system section receives a compaction instruction set including the size of the new code section; and, wherein the compactor accesses the compaction instruction set to determine the size of the new code section in the file system section and determines if the new code section can be arranged with the current code sections in the code storage section, in response to measuring the size of symbol libraries arranged within corresponding code sections and determining the size of the new code section(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 48:

The rejection of claim 45 is incorporated, and further, Hutchison teaches:

the compactor determines the size of unused memory blocks in the code storage section and stores the new code section in the unused memory block, if the size of the unused memory block is greater than, or equal to the new code section size(i.e. col. 6

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lines 9-21; col. 5 lines 11-61).

Per claim 49:

The rejection of claim 45 is incorporated, and further, Hutchison teaches:

the compactor calculates the code section sizes and, in response to calculating the code section sizes, generates a compaction schedule; wherein the file system section temporarily stores code sections from the code storage section; and, wherein the compactor stores the code sections from the file system section into the code storage section memory blocks to maintain contiguous addressing, in response to the compaction schedule(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 50:

The rejection of claim 49 is incorporated, and further, Hutchison teaches:

the compactor generates an updated code section address table, in response to changing the start addresses of code sections stored within the memory blocks, and, wherein the updated system software accesses the updated code section address table after the new code section is arranged with the current code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 51:

The rejection of claim 50 is incorporated, and further, Hutchison teaches:

the file system section receives a new code section with an updated symbol offset

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address table; and, wherein the updated system software accesses the updated symbol offset address table after the new code section is arranged with the current code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 52:

The rejection of claim 39 is incorporated, and further, Hutchison teaches:

the file system section receives a compaction instruction set including code section resizing instructions and a compaction schedule; and, wherein the compactor resizes code sections in response to the code section resizing instructions.

Per claim 53:

The rejection of claim 52 is incorporated, and further, Hutchison teaches:

the file system section temporarily stores code sections from the code storage section; and, wherein the compactor stores the code sections from the file system section into the code storage section memory blocks to maintain contiguous addressing, in response to the compaction schedule(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 54:

The rejection of claim 53 is incorporated, and further, Hutchison teaches:

the file system section receives a new code section with an updated code section address table and an updated symbol offset address table; and, wherein the updated system software accesses the updated symbol offset address table and updated code

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section address table after the new code section is arranged with the current code sections(i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 55:

The rejection of claim 29 is incorporated, and further, Hutchison teaches:

the code storage section and file system section memories are nonvolatile memories (i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 56:

The rejection of claim 34 is incorporated, and further, Hutchison teaches:

: a volatile memory including the first and second table code sections loaded from the code storage section for executing the system software; and, wherein the arrangement of new code sections with the current code sections in the code storage section forms updated system software, following a reset of the wireless communications device to load the updated code section address table and updated symbol offset address table in the volatile memory (i.e. col. 6 lines 9-21; col. 5 lines 11-61).

Per claim 57:

The rejection of claim 56 is incorporated, and further, Hutchison teaches:

the compactor suspends the execution of the system software (i.e. col. 6 lines 9-21; col. 5 lines 11-61)..

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Per claims 1-28, they are the method versions of claims 29-57, respectively, and are rejected for the same reasons set forth in connection with the rejection of claims 29-57 above.

Per claim 58, it is another system version of claims 49 and 56, respectively, and is rejected for the same reasons set forth in connection with the rejection of claims 49 and 56 above.

9. Claims 1-57 are rejected under 35 U.S.C. 102(e) as being anticipated by Yoshida et al. (US patent 6,275,694) hereafter Yoshida.

Per claim 29:

Yoshida discloses:

- In a wireless communications device, a system for reorganizing software instructions stored in a memory, the system comprising: a code storage section memory including executable wireless device system software differentiated into a plurality of current code sections (i.e. col. 5 lines 53-67; col. 6 lines 10-27); a file system section memory for receiving new code sections; a compactor to resize current code sections; and wherein the arrangement of new code sections with the current code sections in the code storage section forms updated system software (i.e. col. 5 lines 53-67; col. 6 lines 10-27).

Per claim 30:

The rejection of claim 29 is incorporated, and further, Hutchison teaches:
the file system section receives a compaction instruction set with instructions for identifying a current code section for updating; and, wherein the compactor replaces the identified current code section in the code storage section with the new code section (i.e. col. 5 lines 53-67; col. 6 lines 10-27).

Per claims 1-2 and 2821, they are the method versions of claims 29-30, respectively, and are rejected for the same reasons set forth in connection with the rejection of claims 29-30 above.

As per claims 3-27 and 31-57, these claims are rejected for dependency on the above rejected parent claims 1 and 29.

Response to Arguments

10. Applicant's arguments with respect to claims 1-58 have been considered but are moot in view of the new ground(s) of rejection. Therefore, this action is made non-final.

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Insun Kang whose telephone number is 571-272-3724. The examiner can normally be reached on M-F 7:30-4 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kakali Chaki can be reached on 571-272-3719. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

I. Kang
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